

### **REMARKS**

This paper is in response to the final official action dated final official action dated July 16, 2010 and notice of appeal filed January 18, 2011 (hereafter, “the official action”). This paper is timely filed as it is accompanied by a petition for extension of time and authorization to charge our credit card account in the amount of the requisite fee. The Director is hereby authorized to charge any deficiency in the fees filed, asserted to be filed or which should have been filed herewith to our Deposit Account No. 13-2855, under Order No. 29610/CDT386.

Claims 1-13 and 15-17 are pending, but claim 5 has been withdrawn as directed to a non-elected invention.

By the foregoing, claims 1 and 13 have been amended. Support for amendments to claims 1 and 13 can be found, for example, at page 9, first full paragraph of the counterpart PCT application publication. Support for amendments to claim 13 can also be found in original claim 1. No new matter has been added.

### **CLAIM REJECTIONS — 35 U.S.C. §112, 2nd PARAGRAPH**

Claims 13 remains rejected as assertedly indefinite for reciting the term “metal complex”. The applicant respectfully disagrees with the rejection for reasons of record. Notwithstanding the same, claim 13 has been amended to advance prosecution. Reconsideration is respectfully requested.

### **CLAIM REJECTIONS — 35 U.S.C. §112, 1st PARAGRAPH**

All pending claims 1-13 and 15-17 have also been rejected as assertedly not enabled. The applicant respectfully disagrees with the rejection for reasons of record.

Further, the applicant respectfully submits that the “*Condensed Chemical Dictionary*” entry referenced by the examiner does not demonstrate any inconsistencies in previously provided definitions of heteroaryl. One of ordinary skill in the art would readily recognize that the *Condensed Chemical Dictionary* entry for heteroaromatic does not constitute evidence that heteroaromatic and heterocyclic are coextensive terms. Rather, one of ordinary skill, particularly in view of the high skill level in the art, would readily recognize that heteroaromatic is a species of the genus heterocyclic.

Further, *In re Wiggins* does not support the conclusion of non-enablement.<sup>1</sup> *Wiggins* is easily distinguished from the presently claimed invention on the basis that the subject matter claimed in *Wiggins* relates to compounds having anti-Parkinsonism activity. The claimed subject matter claimed in *Wiggins* was determined to be so broad that it was entirely speculative as to the *required therapeutic activity*. Indeed, the appellant was advancing a definition of a claim term that was not present in the claim but was in the specification, presumptively in order to argue a claim scope consistent with the aforementioned therapeutic activity. No such concerns are present here. *Wiggins* is therefore not applicable to the subject matter at hand.

Notwithstanding the same, claims 1 and 13 have been amended to advance prosecution and recite “Ar<sup>1</sup>-Ar<sup>2</sup> forms one carbon-M bond and one nitrogen-M bond by reaction of M with a carbanion of Ar<sup>1</sup>-Ar<sup>2</sup>.” As a result, Ar<sup>1</sup>-Ar<sup>2</sup> species such as phenyl-phenyl and pyridinyl-pyridinyl have been positively excluded.

In view of (i) the foregoing comments, (ii) the numerous prior art examples demonstrating (two-step) formation of metal complexes having formula M(Ar<sup>1</sup>Ar<sup>2</sup>)<sub>n</sub>L from halo-bridged complexes having formula (I), and (iii) the high skill level of one having ordinary skill in the relevant art, the outstanding enablement rejections should be withdrawn.

#### **CLAIM REJECTIONS 35 U.S.C. §103(A)**

Claims 1-5 and 8-17 have been rejected as assertedly obvious over EP 1349435 to Kamatani et al. (hereafter “Kamatani”). Claims 1-13 and 15-17 have been

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<sup>1</sup> The citation given at page 7 of the July 16, 2010 action (179 USPQ 421) and the excerpted text correspond to *In re Wiggins*, not *In re Hawkins* as indicated by the examiner.

rejected as assertedly obvious over WO 02/15645 A1 to Lamansky et al. (hereafter “Lamansky”).<sup>2</sup> The rejections are traversed.

Kamatani and Lamansky merely disclose reacting a halo-bridged dimer with a bidentate ligand such as acetylacetone (“acac”) or picolinic acid (“pic”) to break the stable chloro-bridged dimer and form monomeric complexes. Kamatani specifically teaches that the monomeric complex must then be isolated and/or purified, and further reacted in a separate step with a second bidentate ligand, which is capable of forming at least one carbon-to-metal bond with the metal of the complex to obtain a metal complex of formula  $M(Ar^1Ar^2)_nL$ , as claimed. *See*, for example, Kamatani at Example 28. Lamansky does not even disclose further reaction of the monomeric complexes. *See* Lamansky at pages 41-47. Thus, the cited documents invariably involve two steps to form a metal complex, as claimed.

In addition to the difference in the number of steps, the cited art also fails to disclose all of the claim limitations, specifically, reaction of a compound of formula (I) with a bidentate ligand L in the presence of the enabling ligand as in claim 1 or forming a halo-bridged dimer and then reacting same with a reactive ligand to form a compound of formula (I) in a one-pot process as in claim 13. Accordingly, the cited documents do not disclose forming a metal complex of formula  $M(Ar^1Ar^2)_nL$  by reacting a halo-bridged dimer complex according to formula (I) with a bidentate ligand L of formula  $Ar^1-Ar^2$  in the presence of an enabling ligand capable of breaking the halogen bridge of the complex according to formula (I), as recited in claims 1-12 and 15-17. Similarly, the cited documents also do not disclose forming a metal complex of formula  $M(Ar^1Ar^2)_nL$  by forming a halo-bridged dimer and then reacting same with a reactive ligand capable of breaking the halogen bridge in a one pot process, as recited in claim 13.

The examiner relies on Dorwald as demonstrating that “it is well within the purview of the skilled artisan in the relevant art to reduce steps in order to achieve the desired product faster and in higher yields.” *See* page 10 of the outstanding official action. In this respect, Dorwald contemplates redesigning a synthesis to have fewer steps. Admittedly, this goal is not new or revolutionary. Dorwald, however, does not disclose or suggest forming a metal complex of formula  $M(Ar^1Ar^2)_nL$  by reacting a

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<sup>2</sup> The rejection of claim 14 is moot in view of its cancellation.

halo-bridged dimer complex according to formula (I) with a bidentate ligand L of formula  $\text{Ar}^1\text{-Ar}^2$  in the presence of an enabling ligand capable of breaking the halogen bridge of the complex according to formula I, as recited in claim 1. Similarly, Dorwald also does not disclose or suggest forming a halo-bridged dimer and then reacting same with a reactive ligand capable of breaking the halogen bridge in a one pot process, as recited in claim 13. Thus, even if the Kamatani and Lamansky were modified in view of Dorwald, one would not arrive at the claimed invention in view of the aforementioned deficiencies of the cited art.

Reaction of the compound of formula (I) with a bidentate ligand L of formula  $\text{Ar}^1\text{-Ar}^2$  in the presence of the enabling ligand as in claim 1 or with a reactive ligand in a one-pot process as in claim 13 is not routine optimization and was neither disclosed nor suggested by the teachings in the cited art. Indeed, the consistent teachings throughout the applied art are to conduct two steps to obtain the claimed metal complexes. Thus, the cited art provides a strong indication that the methods, as claimed, are non-obvious. Reconsideration is respectfully requested.

**CONCLUSION**

It is submitted that the application is in condition for allowance. Should the examiner wish to discuss any matter of form or procedure in an effort to advance this application to allowance, the examiner is respectfully invited to telephone the undersigned attorney at the indicated telephone number.

Respectfully submitted,

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